

Delta Diablo Sanitation District

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October 10, 2013

VIA ELECTRONIC MAIL Keith. Wallace@water.ca.gov

Keith Wallace, Project Manager California Department of Water Resources Division of Integrated Regional Water Management Financial Assistance Branch P.O. Box 942836 Sacramento, CA 94236

SUBJECT:

PUBLIC COMMENTS TO ROUND 2 PROPOSITION 84 IMPLEMENTATION

GRANT DRAFT FUNDING RECOMMENDATIONS

Dear Mr. Wallace:

Delta Diablo Sanitation District (District), as part of the East Contra Costa County Integrated Regional Water Management (IRWM) Program, submitted Project 5 in our Region's Proposition 84 Round 2 Implementation Grant Proposal. In reviewing the proposal evaluation, the District determined the evaluator inaccurately assessed Project 5, particularly with the Benefit and Cost Analysis. We are submitting this comment letter to clarify these inaccuracies, and request a reevaluation and re-scoring of the proposal.

The reviewer indicates the project 5 budget contains substantial costs for pipeline construction, but claims there is little discussion of the pipeline work in the work plan and no figures showing the proposed alignment or new user locations. Pipeline construction is discussed on page 55 of the Work Plan, under Task 5.9: Construction, which states: Task: 5.9. Description: Mobilization of equipment and personnel and preparation of project site for construction will be completed. Preparation will consist of setting up laydown area and securing site. Project Construction will entail excavating and installing piping, including appurtenances to provide recycled water and reroute brine line. Performance Testing will comprise pressure testing to ensure air tight and leak free system. Demobilization of equipment and personnel, and restore site upon completion of work. Deliverables: As-built drawings, O&M Manuals for pumps and tank, Final post-construction testing Reports. New user locations and alignments are presented in Figure 9, on page 52 of the work plan.

The evaluation incorrectly claims there are easement costs associated with redirecting the Dow Chemical Company total dissolved solids stream to the District Treatment Plant that are not described in the work plan. The easements associated with redirecting the Dow Chemical Company total dissolved solids stream to the District Treatment Plant are described in the work plan on page 53, budget category e, which states: Budget Category (b): Land Purchase/Easement: This task involves the land purchase acquisition activities associated with the Recycled Water Salinity Reduction and Distribution System Expansion Project. Description: Right-of-ways and easements may be needed from partner agencies to install new pipe for establishing recycled water service and re-routing Dow TDS stream. Deliverables: Easements

Keith Wallace, Project Manager California Department of Water Resources October 10, 2013 PUBLIC COMMENTS TO ROUND 2 PROPOSITION 84 IMPLEMENTATION GRANT DRAFT FUNDING RECOMMENDATIONS Page 2

The reviewer indicates Project 5 inappropriately claims both an avoided cost and a water supply benefit. The project was developed as two components: a total dissolved solids (TDS) reduction component, and a new recycled water (RW) connections component. Without the project, sidestream Reverse Osmosis (RO) would be implemented and no new RW connections would be realized. As such, the benefit of the TDS reduction component was described as an avoided cost associated with achieving TDS reduction through the no project conditions (sidestream RO), and no other benefits were accounted for (e.g., no water supply benefit). The RW connections component was monetized based on the benefit associated with increased supply. These components are related in that they are both part of a larger recycled water program, but are not interrelated and can be viewed and monetized as two separate projects. As such, there was no double-counting of benefits. This is described on page 143 of Attachment 8.

In addition, the reviewer asserts that sidestream RO is not the likely no project condition for the TDS reduction component. As discussed in Section 4.2 of the Delta Diablo Sanitation District TDS Reduction Advanced Treatment Feasibility Study (Appendix 5-2 to attachment 7; provided in file Att7_IG2_TechJust_20of20), RO treatment is the alternative to Segregation of High Salinity Waste Streams and would be implemented in the absence of the proposed project.

In addition to Project 5, the attachment identifies other inaccuracies in the Proposal Evaluation, and provides corrective information for your consideration.

Accurate review and evaluation of these very complex applications is critical to the applicants, as we have invested significant time and cost to prepare these proposals for funding consideration. We understand that this is a competitive process and funding is limited. We also feel strongly that we have submitted sufficient documentation for projects that will provide multiple benefits, not only to our IRWM region, but beyond as well because of our location in and reliance on the Delta. We respectfully request that DWR review the technical details of the Benefit and Cost Analysis as provided in this letter and the proposal, and reconsider the proposal score accordingly.

Sincerely,

Dean Eckerson Principal Engineer

JS/DE:ck

Attachment

cc: Marie Valmores, Contra Costa Water District District File Chron File

PROPOSAL EVALUATION

Proposition 84 Integrated Regional Water Management (IRWM) Grant Program Implementation Grant, Round 2, 2013

Applicant	Contra Costa Water District	Amount Requested	\$ 3,391,246
Proposal Title	East Contra Costa County IRWM Prop 84 Round 2 Implementation Grant Proposal	Total Proposal Cost	\$ 11,570,783

PROJECT SUMMARY

The proposal consists of six projects: (1) Beacon West Arsenic Well and Tank Replacement; (2) Rossmoor Well Replacement/Groundwater Monitoring Well System Expansion; (3) Integrated Regional Flood Protection and Water Quality Improvement Borrow Area; (4) Knightsen Wetland Restoration and Flood Protection; (5) Recycled Water Salinity Reduction and Distribution System Expansion; and (6) East Contra Costa County Prop 84 Round 2 Grant Administration.

PROPOSAL SCORE

Criteria	Score/ Max. Possible	Criteria	Score/ Max. Possible
Work Plan	12/15	Technical Justification	6/10
Budget	3/5	g	10
Schedule	5/5	Benefits and Cost Analysis	15/30
Monitoring, Assessment, and Performance Measures	3/5	Program Preferences	10/10
	•	Total Score (max. possible = 80)	54

EVALUATION SUMMARY

WORK PLAN

The criterion is fully addressed but is not supported by thorough documentation or sufficient rationale. The work plan states the goals and objectives of the proposal and how it helps achieve the goals and objectives of the functionally equivalent IRWM Plan. The proposal presents six projects that are summarized in Table 3-1 which includes an abstract, a percent design completion estimate, and identifies the implementing agency. Tasks in the work plan include appropriate deliverables and reporting submittals, including quarterly and final reports. The work plan also includes a list of required permits and the status of environmental documentation. However, project descriptions lack sufficient detail to demonstrate how they will be completed. Most projects will be operational as standalone projects but one is part of a larger phased effort (Project 3). The work plan does not include an adequate description of Data Management and Monitoring Deliverables.

BUDGET

The budgets for more than half of the projects in the proposal have detailed cost information, but not all costs appear reasonable and supporting documentation is lacking for a majority of the budget categories. A proposal summary budget and detailed budgets for each project are provided. The budgets for all projects are broken out by tasks, but costs for some of the projects lack supporting documentation. For example, project 4 only provides a lump sum for the land purchase with no back-up documentation or reference to supporting information, which makes it difficult to determine how the cost was estimated. Project 5 row (g) "Other Costs" includes \$12,150 for legal fees, but no description is included to validate the line item expense. There are also some inconsistencies with the work plan. For example, in the project 5 budget, there are easement costs associated with redirecting the Dow Chemical Company total dissolved solids stream to the District Treatment Plant, but this is not described in the work plan. The project 5 budget also contains substantial costs for pipeline construction but there is little discussion of the pipeline work in the work plan and no figures showing the proposed alignment or new user locations.

SCHEDULE

The schedule criterion is fully addressed and is supported by thorough documentation and logical rationale. Each schedule's tasks are consistent with the work plan and budget and are considered reasonable. The schedule conveys at least one project will be ready to begin construction no later than October 2014.

MONITORING, ASSESSMENT, AND PERFORMANCE MEASURES

The criterion is less than fully addressed and documentation and rationales are incomplete and insufficient. The identified monitoring targets appear appropriate for the benefits claimed in some cases, but some targets could include more specific quantifiable targets. It is not clear from the information provided if the monitoring and assessment tools and methods will effectively monitor the project's performance and target process. The measurement tools and methods for Project 2 seem adequate but there are no numeric targets. Project 3 claims water quality and flood protection benefits, but there is no mention of flood targets, performance indicators and/or measurement tools. Project 4 lacks the detail and targets necessary to track progress to meet targets and projects goals. For example, project 4 should have included numeric water quality targets in order to track progress towards meeting water quality standards in the restored wetland.

TECHNICAL JUSTIFICATION

The proposal appears to be technically justified to achieve the claimed benefits but lacks documentation that demonstrates the technical adequacy and physical benefits of the project are not well described. For example, project 2 claimed both groundwater supply benefits and "Supply Left in Delta" benefits which is a double count. Most of project 3's benefits are not valid, as they are actually created by components of the Contra Costa Canal Levee Elimination and Flood Protection Project or Upper Sand Creek Basin (USCB) Project that are not part of this Proposal.

BENEFITS AND COST ANALYSIS

Collectively the proposal is likely to provide a medium level of benefits in relationship to cost, but the quality of the analysis or clear and complete documentation is lacking. Projects 1 and 2 both appear to provide a high level of benefits (about \$696,000 and \$3,172,000, respectively) in relationship to cost (\$430,000 and \$2,269,000, respectively), but they account for only 23 percent of the Proposal's net present value (NPV) costs. The other three projects, which account for about three-quarters of the Proposal costs, have monetized, documented benefits that are less than costs. However, to the extent that the Knightsen Wetland Restoration and Flood Protection Project enables the purchase of irrigated land suitable for future conversion to habitat, this project might have substantial non-monetized benefits.

Project 3 claims 2.1 percent (450 feet/21,000 feet) of the Contra Costa Canal Levee Elimination and Flood Protection Project's total project benefits because "With the Project, an additional 450 feet of Canal could be encased within a

buried pipeline within the existing funding constraints." However, from Attachment 4, the project does not include any pipeline costs. Since most project benefits are enabled by the pipeline, not the covering of it, it is inappropriate to claim the 2.1 percent share of total benefits. The project also claims "accelerated USCB [Upper Sand Creek Basin] flood protection benefits." The project allows FDR benefits to be obtained beginning in 2018 rather than 2023. The claimed benefit is \$27.8 million dollars per year for each of the 5 years. This number is the NPV of flood damage reduction benefits from a previous application. The Expected Annual Damages should have been entered for each of the five years, not the NPV. This reduces the "accelerated USCB flood protection benefits" to \$325,000 (\$5.12 million divided by 15.76).

Project 4 has monetized benefits that are less than costs but non-monetized benefits are probably substantial. The project would purchase about 1 square mile of irrigated land suitable for restoration to a variety of native habitats for \$7,500 an acre. This seems to be an excellent price. The project would fund restoration work on 30 acres, a small fraction of the purchase, and the value of future restoration on over 600 acres is not counted. It might make more sense, for this application, to count only the purchase cost of the 30 acres that is proposed for restoration. The Present Value of monetized benefits (\$2.87 million) is less than costs (\$4.81 million). Water quality and flood damage reduction benefits are not monetized.

Project 5's analysis inappropriately claims both an avoided cost and a water supply benefit. If the sidestream reverse osmosis (RO) project must be implemented in the without-project condition, then this is the avoided cost, but then the water supply benefits would be achieved either with or without the project. If the without project condition does not include the sidestream RO project, then the water supply benefits should be counted. The available documentation does not suggest that the sidestream RO project is the likely, without-project alternative. The appropriate level of quantified benefit is probably the water supply benefit with energy, fertilizer and greenhouse gas benefits, \$702,336, which is less than the net present value of costs of \$3.077 million.

PROGRAM PREFERENCES

Applicant claims that six program preferences and seven statewide priorities will be met with project implementation. However, applicant demonstrates high degree of certainty, and adequate documentation for 11 of the preferences claimed: (1) Include regional projects or programs; (2) Effectively integrate water management programs and projects; (3) Effectively resolve significant water-related conflicts within or between regions; (4) Contribute to attainment of one or more of the objectives of the CALFED Bay-Delta Program; (5) Address critical water supply or water quality needs of disadvantaged communities within the region; (6) Drought Preparedness; (7) Use and Reuse Water More Efficiently; (8) Expand Environmental Stewardship; (9) Practice Integrated Flood Management; (10) Protect Surface Water and Groundwater Quality; and (11) Ensure Equitable Distribution of Benefits.

Comments on Proposal Evaluation

Attachment 3

 The work plan does not include an adequate description of Data Management and Monitoring Deliverables.

Every project includes descriptions of data management and monitoring deliverables in Task 1. For example, on page 25, for project 1, task 3.1 is described as including the preparation and submittal of quarterly reports and a project completion report to DWR. Also, a Project Performance Monitoring Plan will be prepared to provide a framework for assessing and evaluating the project performance once it is implemented. The Monitoring Plan will identify the measures that will be used to monitor progress toward achieving the specific project goals. Attachment 6 of this Proposal consists of Monitoring, Assessment, and Performance Measures for the Project which will provide a basis for the Monitoring Plan. Deliverables are indicated as Quarterly and Project Completion Reports to DWR starting after contract execution and a Project Performance Monitoring Plan. Similar language and deliverables are identified for every project in the proposal, as discussed on page 31 (project 2, Task 2.3), page 41 (project 3, Task 3.3), page 47 (project 4, Task 4.3), and page 53 (project 5, Task 5.3). Attachment 6 contains detailed information on the data collection and monitoring to be implemented for each project and included in the referenced Project Performance and Monitoring Plans for each project.

Attachment 6

• The measurement tools and methods for Project 2 seem adequate but there are no numeric targets.

Numeric targets identified for project 2 on page 8 are: Replacement well delivers 1,400 gpm, 1,200 feet of larger supply line installed, Multiport monitoring well installed.

- Project 3 claims water quality and flood protection benefits, but there is no mention of flood targets, performance indicators and/or measurement tools.
 - On page 9, the flood-related performance indicator Reused material supports flood protection project performance is identified.
- Project 4 lacks the detail and targets necessary to track progress to meet targets and projects goals. For example, project 4 should have included numeric water quality targets in order to track progress towards meeting water quality standards in the restored wetland.

Because current baseline water quality information is not available, water quality improvements from Project 4 will be measured in terms of increased treatment capacity

and reduction relative to baseline. This Project 4 includes numeric targets on page 10: 17 acre-feet of stormwater treatment capacity, 30-acre treatment wetland, Reduced pollution from agricultural runoff. The performance indicators Reduced nutrient, bacteria, sediment, and pesticide concentrations released into the Delta directly address measurable water quality improvements with respect to baseline. This is further supported by the measurement tool / method Monitor water quality entering and discharging from the wetlands to establish water quality improvements (refer to p 10).

Attachment 7

• For example, project 2 claimed both groundwater supply benefits and "Supply Left in Delta" benefits which is a double count.

This is not a double-count, because the 500 AFY of supply in the Delta was not included as a supply benefit, but a relative measure of water quality improvement, as indicated on pages 10-11 and Table 7-3.

• Most of project 3's benefits are not valid, as they are actually created by components of the Contra Costa Canal Levee Elimination and Flood Protection Project or Upper Sand Creek Basin (USCB) Project that are not part of this Proposal

The proposed project will further the Contra Costa Canal Levee Elimination and Flood Protection Project and Upper Sand Creek Basin (USCB) Project, increasing the percentage of each project achieved by building additional pipeline and increasing detention basin capacity (as discussed on pages 15-16. DWR indicated in its public meeting related to economic analysis for implementation grant funding that it is acceptable to apportion a percentage of project benefits based on the portion of the project that would be implemented. Because the proposed project results in a portion of the Contra Costa Canal Levee Elimination and Flood Protection and Upper Sand Creek Basin (USCB) Projects to be implemented, it is appropriate, based on DWR's guidance, to allocate a portion of the benefits associated with implementation of those projects.

Attachment 8

• Project 3 claims 2.1 percent (450 feet/21,000 feet) of the Contra Costa Canal Levee Elimination and Flood Protection Project's total project benefits because "With the Project, an additional 450 feet of Canal could be encased within a buried pipeline within the existing funding constraints." However, from Attachment 4, the project does not include any pipeline costs. Since most project benefits are enabled by the pipeline, not the covering of it, it is inappropriate to claim the 2.1 percent share of total benefits.

The proposed project will further the Contra Costa Canal Levee Elimination and Flood Protection Project, increasing the percentage of benefits achieved by enabling construction of additional pipeline (as discussed on page 27 and as acknowledged by DWR's review comments on Attachment 3, work plan, where the DWR reviewer states that the project is part of a larger, phased project). DWR indicated in its public meeting

related to economic analysis for implementation grant funding that it is acceptable to apportion a percentage of project benefits based on the portion of the project that would be implemented. Because the proposed project results in an additional portion of the Contra Costa Canal Levee Elimination and Flood Protection Project to be implemented, it is appropriate, based on DWR's guidance, to allocate a portion of the benefits associated with implementation of those projects. The executed Prop 1E contract, which includes the estimated cost and level of effort for completing the Prop 1E project, is provided as Appendix 3-3.11 (also referenced on page 27).

- The project also claims "accelerated USCB [Upper Sand Creek Basin] flood protection benefits." The project allows FDR benefits to be obtained beginning in 2018 rather than 2023. The claimed benefit is \$27.8 million dollars per year for each of the 5 years. This number is the NPV of flood damage reduction benefits from a previous application. The Expected Annual Damages should have been entered for each of the five years, not the NPV. This reduces the "accelerated USCB flood protection benefits" to \$325,000 (\$5.12 million divided by 15.76).
 - The claimed benefit is not \$27.8 M per year as stated by the reviewer. The claimed benefit is the difference in value of \$27.8 M in flood benefits realized in 2018 as opposed to the value of \$27.8 M in flood benefits realized in 2023. As such, the \$27.8 M in flood reduction benefits was entered in 2018 to calculate the discounted value of this benefit in 2018. The discounted value of \$27.8 M in flood reduction benefits achieved in 2023 was then subtracted from this benefit, to develop a total benefit of (\$20,259,993 \$15,139,445 = \$5,120,548) as shown in Table 15 on pages 52 and 54. Further, the reviewer expresses no objection to methodology of assigning a portion of flood control benefits for the USCB project achieved through the proposed project, consistent with DWR's indication that this methodology is acceptable (as indicated by DWR in its public meeting related to economic analysis for implementation grant funding). If this methodology is acceptable in attachment 8 for the USCB project, it should also be acceptable in Attachment 8 for the Canal project, and in Attachment 7 for both projects.
- Project 4 has monetized benefits that are less than costs but non-monetized benefits are probably substantial. The project would purchase about 1 square mile of irrigated land suitable for restoration to a variety of native habitats for \$7,500 an acre. This seems to be an excellent price. The project would fund restoration work on 30 acres, a small fraction of the purchase, and the value of future restoration on over 600 acres is not counted. It might make more sense, for this application, to count only the purchase cost of the 30 acres that is proposed for restoration. The Present Value of monetized benefits (\$2.87 million) is less than costs (\$4.81 million). Water quality and flood damage reduction benefits are not monetized.

The value of water quality and flood damage reduction benefits is unknown, which is why they were not monetized. An attempt was made to quantify these benefits, but that quantification (e.g., treatment of 17 AF of stormwater per event) cannot be readily converted to a monetized value.